

## **4B – Exhibit 1: Summary of Comments Submitted on Draft Alameda Bicycle Facility Design Guidelines**

**01/25/12**

*Lucy Gigli (President of BikeAlameda)*

Submitted at December 2011 Transportation Commission meeting

- bike paths should be ten feet with two feet shoulders not eight feet
- Bike lane widths should include how the parking lane is defined. The bike lanes are too close to the car doors so she wants to see this revised in the document.

Submitted via email

- page 17 – buffered bike lane Correction to the text: A minimum buffer width should be 2'. The text says an 8' area, which implies a 6' bike lane and 2' buffer, but the picture shows a 6' buffer and 6' bike lane.
- page 19 is completely missing
- new: can we somehow discourage the use of the bike rack that is used out in front of the Main Library. I constantly have problems with the bracket attachments hitting pedals and making it difficult to fit. Particularly with the kids bikes. I have attached a picture. Since there are other racks that work just as well that don't have the brackets, it seems like an easy thing to dissuade. for the DG, on page 32, maybe something like "no have any protrusions that make it difficult to snugly fit the bike against the rack"???
- page 15 correction: the picture lists 7.5 ' preferred parking lane. In the text it says 8'.
- page 40 - bike cage. We recently had an incident where the planning department staff approved a bike cage without bike racks. Can you add a comment in this section that says that bicycles are locked to bike racks in a bike cage.
- Can you explain "visibility zone" on page 34? It appears that in the AMC, the zone applies to structures greater than 3' which neither a bike nor a rack are.
- page 34 -Crosswalk spec is 5'. Is this the same regulation for auto parking? Is a vehicle allowed to be parking closer than 5' to a crosswalk?

*Jon Spangler (Alameda resident and a League of American Cycling Instructor)*

Submitted at December 2011 Transportation Commission meeting

- He seconds what Lucy said.
- On the class I bike paths on page 4 – He would like to see 12 feet as the recommended minimum because these paths become multi-use paths. Twelve feet accommodates multiple conflicts, users, directions and speeds. Twelve feet should be the floor and should be the minimum for each side of the west span of the Bay Bridge. Golden Gate Bridge is ten feet and seems too narrow.
- On Page 34 regarding in-street bike corrals, earlier in the year we had conversations about having them in front of businesses such as Stones Cyclery even on a trial basis. Park Street is going to need more bike parking due to the elimination of the parking meters along Park Street totaling about 100 de-facto bike parking spaces.
- Class II bike lanes – such as Central Avenue between Willow Street and Oak Street is 5.5 feet – if you recommend an effective door zone of five feet between the bicycle tire and the parked car to allow for sudden doors to be opened, bicyclists on Central Avenue need to ride with their bicycle tires on the bike lane. It says something about

the current practice as three feet yet they are talking about changing it nationally because the average door on an SUV is four feet when open. Bicyclists need one foot between the door and the bicycle to ensure that the bicyclist is predictable and safe. He recommends an increase in the width of bike lanes and at least a four-foot door zone.

Submitted via email

- P. 10, collisions between right-turning vehicles and bicyclists traveling straight on a bike path as they cross the street. I think the phrase should be "...as **they** cross the street..."
- **Suggested Addition to Introduction of the DRAFT Bicycle Facility Design Guidelines:** Providing bicycle-specific facilities (signs and pavement markings, paths, routes, parking racks, etc.) is an important means of providing bicyclists safe and efficient travel throughout Alameda. The facilities covered by these guidelines are only part of the solution for safe cycling, however. No investment in bicycle-specific facilities can compensate for improper or illegal behavior by pedestrians, drivers, or cyclists.

Motorist, pedestrian, and cyclist safety depends on all road users knowing and following the "rules of the road" contained in the California Vehicle Code and on their ability to "share the road" when using city streets. Widespread cyclist and motorist education are critical to achieving safety for all roadway users: bicycle facilities cannot substitute for drivers and cyclists having and using current skills and knowledge based on the CVC, particularly Sections 21200 through 21212, which address bicycle operations.

The CVC, the City of Alameda's 2009 Transportation Master Plan, and the 2010 Update of the 1999 Bicycle Plan provide the legislative and policy context for these Bicycle Facility Design Guidelines.

All page numbers below refer to the BFDG PDF itself, not to the staff report:

- As I commented at the December Transportation Commission meeting, I believe the DRAFT Bicycle Facilities Design Guidelines discussion and recommendations on Class II Bike Lanes (BFDG pp. 14-17 and 41-42/46) is currently inadequate in three areas:
  - 1) The discussion on pp. 14-15 as well as pp. 41-42 needs to include additional information on and detailed illustrations of the nominal and effective/actual widths of the parking strip, the door zone, and the bicycle/bicyclist using the bike lane.
  - 2) The minimum and preferred recommendations should be increased and clarified to provide sufficient room for cyclists to safely ride within the lane and suitable signage provided.
  - 3) The BFDG and proper signage on Alameda's streets should clearly emphasize the cyclists's ability to leave the confines of the bike lane--including taking the entire lane--to avoid hazards such as the door zone, make turns as needed, etc., under CVC Section 21208.

## 1. ADDITIONAL INFORMATION NEEDED

The discussion of bike lanes (p.14ff) should mention the hazards of the door zone and its dimensions (usually at least 40 inches and up to 5 feet in exceptional circumstances). The actual dimensions of the on-street parking, the door zone, and the necessity for cyclists to position themselves up to 5 feet from any parked car should be clearly mentioned in this discussion.

a) Parked cars vary in width and drivers can legally park almost two feet out from the curb. A large SUV (think Chevy Suburban) parked 18 inches from the curb will be more than 8 feet from the curb and project considerably into the bike lane. Add the Suburban's wide doors to the equation and a cyclist is probably forced to ride entirely in the traffic lane. (This is entirely legal but a novice cyclist might remain in the hazardous zone strictly because of the presence of the striped bike lane.)

b) The cyclists' handlebar--which usually extends at least 12 inches from the stem on both sides and can extend almost twice that--has to clear the fully-opened door of a parked vehicle.

c) The cyclist should not have to swerve to avoid contact with the door and the recommended minimum "anti-swerve" zone that I teach as a League Cycling Instructor is 12 inches (one foot). This means that a cyclist in a 5 1/2-foot-wide Class II bike lane adjacent to a parked SUV with a 46-inch door would need to ride on the left-hand paint stripe to avoid contact with an opening door.

d) Cyclists positioning themselves on the left-hand paint stripe in order to avoid contact with the open doors of parked cars will then occupy a foot or more of the main vehicle travel lane. (This is entirely legal, as mentioned in (a) above, but doing so angers many drivers who do not realize that the cyclist is protecting every road user's safety by avoiding the door zone. Many drivers mistake this accident avoidance for a deliberately antagonistic political act and react aggressively to it as such.)

e) Is the 2 1/2-foot "ridable surface" guideline mentioned in Figure 6 (p.16/46) meant to apply to bike lanes adjacent to on-street parking? If it is, having a 5 1/2 foot bike lane adjacent to an 8-foot parking strip occupied by larger and wider vehicles appears to violate it.

## 2. INCREASE THE RECOMMENDED BIKE LANE WIDTHS

a) On-street parking lanes should always be established at an 8-foot *de facto* width. The centers of the hash marks ("parking Ts," p. 41-2, Figure 24) should be placed 7 feet from the curb but the portion of the "T" perpendicular to the direction of travel that indicates the parking spaces marks should extend another 6-12 inches towards the centerline from the mark placed parallel to the curb. The actual bike lane should only begin at the outer (centerline) edge of the extended parking T that extends towards the centerline.

b) Using simple math and having measured some of Alameda's streets, I recommend that Class II bike lanes be at least 6-7 feet wide whenever possible on any streets where they are adjacent to on-street parking. Bike lanes should always be accompanied by the extended parking Ts (see above) and parking lanes should be

marked as 7 feet wide but bike and traffic lane widths computed based on an 8 foot parking lane.

c) Cyclists should be encouraged and warned to stay 5 feet or so from parked cars to avoid the door zone. Informational signs to this effect as well as bike safety classes could help educate cyclists and motorists alike.

### 3. ADDITIONAL SIGNAGE RE: CVC SECTION 21208

a) Signs should be posted to remind drivers and cyclists that bicyclists have the right to use the full width of the travel lane when necessary (such as when a travel lane is too narrow to safely share while avoiding the door zone), per CVC Section 21208.

*Economic Development Commission, 1/18/12 meeting:*

Recommended that there be educational programs for bicyclists to help ensure compliance with the rules of the road.

*Numerous comments were submitted regarding the proposed buffered bike lane design. These comments are presented below.*

*Scott Mace (Berkeley resident/East Bay Bicycle Coalition)*  
submitted via email

- First concern is the term "buffered bike lane." My understanding is that bike lanes under California law cannot contain a buffer between the roadway and the lane and still be considered Class II bike lanes. So first thing we need to do is to find a name for "buffered bike lane" that doesn't contain the term "bike lane." a.k.a. cycle track. Page 17 of 46 is the page where this confusion is introduced in the document.
- I am concerned that buffered bike lanes in Alameda will prevent me from leaving such bike lanes to make a left turn across a street as a bicycle driver, instead of requiring me to proceed to the end of the block and then make a U-turn in order to reach my destination. The Alameda Guidelines would do well to state that such movements are either legal or illegal, and thus allow bicyclists to decide whether that is what they want, or if the proposed facility should be accompanied by a repeal of CVC 21208.

*Michael Graff (East Bay Bicycle Coalition)*  
submitted via email

- Because of the buffer, these don't meet the standard for Class II bike lanes. They might qualify as Class I bike paths, depending how they're designed. Or they might qualify under the lesser-known options of a Class III bike route. Or they might be "hors catégorie", undefined in the HDM, the CA MUTCD, and the CVC.
- Since they're not Class II bike lanes, [CVC] 21208 doesn't apply. That gives cyclists the option of riding in either the bike path/route/thing, or in the travel lane. Adding sharrows to the center of the travel lane would probably be a good way to make that option clear. And they should definitely not be called, or marked as, "bike lanes". That would be very

confusing, and legally dubious. However, the problem of crossing between the travel lane and the bike path/route/thing is still there because of the double stripe. That double stripe is the legal equivalent of a physical barrier (per CVC 21460). A cyclist in one of these bike paths/routes/things would have to proceed to the intersection, then probably use a box turn to change direction.

- There's also the problem of <http://dmv.ca.gov/pubs/vctop/d11/vc21460.htm> and <http://dmv.ca.gov/pubs/vctop/d11/vc21651.htm>. Cyclists cannot enter, exit, or turn from buffered bikeways by crossing the buffer.
  - CVC 21460 says: "**If double parallel solid white lines are in place, a person driving a vehicle shall not cross any part of those double solid white lines**". Because of CVC 21200, cyclists have the rights and duties of vehicle drivers, so that law would also apply to cyclists. The exceptions are mostly the ones that already apply to double yellow center lines, but they don't make sense in the context of a buffered sidepath.
  - CVC 21651 is even more adamant if the buffer is at least two feet wide, which is true of the ones described by the Alameda document.
- They can't be called bike lanes if painted with a buffer. That just creates even more confusion, and it conflicts with the vehicle code. This is a particular problem because <http://www.dmv.ca.gov/pubs/vctop/d11/vc21208.html> applies only to bike lanes, not to bike routes or bike paths. Page 3 of your draft shows that a standard bike lane has a 6 inch stripe.
- Here's my easy solution: Paint a regular bike lane next to the travel lane, and put an extra stripe to the RIGHT of the bike lane. The bike lane itself remains standard. Cyclists who want more separation from motor traffic can ride as far right as they care to, including to the right of the right stripe. This is a common solution that I see all over the Bay Area, and it works really well on higher-speed arterials where the bare minimum 5-feet on top of a 2-foot gutter with 3-foot storm drains is not very enticing. For example, if you have 12 feet of space, mark it as two 6-foot spaces using two 6-inch stripes.
- As an added bonus, this design keeps the bike lane a consistent distance from the travel lanes, so cyclists can travel in a straight line, rather than slaloming along the road. It also keeps the bike lane away from storm drains, debris, and other hazards that tend to be most prominent at the edge of the road.
- Within 200 feet of intersections, change both lines from solid to dashed, to correspond with <http://www.dmv.ca.gov/pubs/vctop/d11/vc21209.html>. If a right-turn lane is added at an intersection, it looks like style "a" on page 22, where it's obvious that turning motorists must yield to through cyclists.

*Jon Spangler (Alameda resident and a League of American Cycling Instructor)*

- "Buffered" bike lanes do not exist in CalTrans' lexicon, at least not yet, and a different term is needed.
- The design guidelines should clearly state--perhaps repeatedly--that cyclists are encouraged to leave a bike lane whenever and wherever needed, as encouraged by the CVC. (See p. 20/46 for a clear example of this.) This would include avoiding hazards (door zone of up to 5-6 feet from parked cars, potholes, glass, etc.), making legal turns at intersections or into driveways, indicating one's intentions to travel straight through an intersection, and more.
- Perhaps the section on proper turns, etc., that is already on p. 20 should appear before

any detailed discussion of bike lanes in order to reinforce the support for CVC 21208, etc., which is already well-established City of Alameda policy.

- I would not recommend including your Figure 13 (p. 32) unless it is to show an unsatisfactory example. (If that is your intent the caption is inadequate.) The bike lane within the right-hand-turn-only lane could easily be mistaken for a through lane by a bicyclist, who should be centered in the through lane to proceed safely across the intersection. (I believe that adding a bike lane within a turn lane just for cyclists is probably overdoing it and confusing.)

*Lucy Gigli (President of BikeAlameda)*

- In order to avoid having two solid striped lines that indicate a "no crossing zone for all vehicles, San Francisco Municipal Transportation Agency engineers and Caltrans in San Francisco have adopted a convention of dashing the right-hand line of a buffer (bike-side).
- On Alemany Boulevard, striped this summer. It does not have sufficient cross



hatching, though:

- On Sloat Boulevard (CA Hwy 35) between 20th Avenue and Everglade Drive (better crosshatching):



These treatments keep the buffered bike lane a designation of a bike lane. According to California Bike Coalition's Dave Snyder, they will be working with the legislature to fix any confusion.



*Michael Graff (East Bay Bicycle Coalition)*

Regarding alternative designs presented by Lucy Gigli:

- I'm unclear on how the broken line on Alemany fixes the CVC conflict.  
<http://dmv.ca.gov/pubs/vctop/d11/vc21460.htm> says: "If the driver is on the side of the roadway in which the broken line is in place, the driver may cross over the double lines or drive to the left of the double lines when overtaking or passing other vehicles." So cyclists can leave the bikeway for some of the exceptions in listed in 21208, but motorists cannot comply with 21209 or 21717. Nor can cyclists enter the bikeway midblock (unless they were already in it and are overtaking). That also means the parked cars shown in the photos can leave, but they can't have entered in the first place. And since the bikeway is separated from the travel lane by more than a 6" stripe, it is not legally a bike lane. Therefore 21208 cannot apply.
- Meanwhile, the crosshatching on Sloat, which appears to be more than two feet wide, means that the broken line doesn't matter.  
<http://dmv.ca.gov/pubs/vctop/d11/vc21651.htm> says "Whenever a highway has been divided into two or more roadways by means of intermittent barriers or by means of a dividing section of not less than two feet in width, either unpaved or delineated by curbs, double-parallel lines, or other markings on the roadway, it is unlawful to ... drive any vehicle over, upon, or across the dividing section."